

C-A MAINTENANCE, MODIFICATIONS, AND REPAIRS SCHEDULE

RESULTS - November 29, 2001

R. Zaharatos –November 20, 2001(Rev. 2)

SCHEDULE SUMMARY

Maintenance Begins: November 26, 2001, 0800hrs
(HI Gold Beam for RHIC injection off at 0600hrs)

Booster P.S. Power Feeder Switchover: November 26, 2001, 0615hrs(Booster P.S. off-line
from 0615hrs to 1745hrs)

Maintenance Ends For Booster: November 26, 2001, 1530hrs

Linac ready for beam(P/P): November 26, 2001, 1600hrs

Maintenance ends for AGS Ring: November 26, 2001, 1800hrs

RHIC Maintenance Ends: November 29, 2001, 1200hrs

RHIC - secured for beam: November 29, 2001, 1400hrs

Machine Areas Access For :

AGS	Restricted Access - Nov. 26, 0930hrs to 1800hrs
Booster	Controlled Access - 1000-1200
SEB	Controlled Access - No access requests
ATR/U Line	Controlled Access - 1100-1200hrs
Linac	Controlled Access - No access requests
RHIC	Restricted Access - Nov. 26, 2001, 0800hrs to Nov. 29, 2001, 1200hrs (HP surveys required for sectors 10 & 12).

RHIC OPERATIONS NETWORK FIRE WALL UPGRADE(Nov. 26, 0700hrs)

Replacing existing firewall with new version.(J. Gould)
This will isolate subnet 104, 108, and 30. No access will be possible from outside the Laboratory. The replacement should take 30mins. with additional testing up to 2hrs..
If the upgrade has problems falling back to the old system will take 20mins.

RS Problems with CISCO software after two attempts to bring it on-line

C-A POWERED TESTING REQUESTS

AGS

- C 1. A5 Kicker
- C 2. B3 and C3 Gamma Tr(temporary test set-up)

RHIC

- C** 1. Snakes at 3 and 9 O'clock(Bruno) - Nov. 26-29
- C** 2. Main P.S.'s(Bruno) - Nov. 26-29
- C** 2. Quench Detection tests(Ganetis) - Nov. 26-29
- C** 3. AC Dipole in Sector 4(P. Oddo)

PRIMARY JOBS

JOBS STATUS CODE: **C** complete **IP** in-process **RS** reschedule **CAN** cancelled

AGS RING EQUIPMENT

- C** 1. New Gamma TR - install(10hrs) new set-up for preliminary test(B3 and C3 quads)[PP Grp./M. Bai & J Lin Mi]
- RS** 2. New DC Bump - cable new configuration[PP Grp./J Lin Mi]
- C** 3. A5 Kicker - check and replace terminations as required[PP Grp./A. Zhang]
- RS** 4. G10 Kicker - repair interlocks[PP Grp./A. Zhang]
- C** 5. E15 IPM - Pump out gas lines(Vacu)
- C** 6. Inspect sextupoles for upcoming replacement program
- C** 7. C20 Polarimeter - replace with thinner targets.
- C** 8. C5 IPM - test/repair servo(Beam Comp.)

AGS EXTERNAL EQUIPMENT

- C** 1. Westinghouse Motor/Generator - detailed cleaning
- 2. Vacuum - check for incorrect readbacks and repair/replace power supplies.(Vacu)
- C** 3. Repair steam condensate line at Bldg. 912(adjacent to F-18), (PE)
- C** 4. Cooling Tower 1 - cleaning
- C** 5. RFMG Cooling Tower - cleaning
- C** 6. RFPA Evap. Cooler - repair leaks and replace fan belt
- RS** 7. Main Magnet Water System - install and download new PLC load
- C** 8. Main Mag. heat exchanger - repack control valves
- C** 9. A10 House air-conditioning - replace shafts on both supply fans.

ATR

- RS** 1. UF2 video - install modified neutral density filter(UGE1 Gate entry), (Beam Inst.)
- C/RS** 2. Access Controls recertification of U/UP and U/Dwn
(75% complete - "U" Upstream needs 12hrs to complete)

BOOSTER RING

- C** 1. F3 Kicker - check terminations(2hrs), (PP Grp.)
- RS** 2. QV1 Magnet - replace power feed junction box at magnet

BOOSTER EXTERNAL

- C** 1. Main P.S. - Off-line from 0615-1745 for LIPA capital improvements to main feeder
- C** 2. QV5 P.S. - replace PC control board for ckt. brkr. trip

RHIC

BRAHMS

- C** 1. Experimental set-up

PHENIX

- C** 1. Experimental set-up
- RS** 2. Cleaning of cooling tower

PHOBOS

- C** 1. Experimental set-up

STAR

- C** 1. Experimental set-up - remove pole pieces and install detectors
- RS** 2. Cleaning of cooling tower
- RS** 3. Cleaning of heat exchangers
- RS** 4. Cooling systems - Install new PLC load, pneumatic control station, PSI control, and new ORP Meter.

RHIC SUPPORT SYSTEMS

- C** 1. Vacuum System PLC at 2, 10, and 12 o'clk - replace co-processor batteries.
- C** 2. Water systems PM's - repack temperature control valves for RF, BRAHMS, and STAR
- C** 3. Controls in 1000P - replace fiber optic chassis(affects ATR and UVW permit link)
- C** 4. Valve Box at 6 o'clk. - replace O Ring in transfer line.

RHIC TUNNEL

- C** 1. Snakes - complete the installations and continue powered testing(Alcoves 9C and 3C) - (Bruno)
- C** 2. Install calorimeter between the 12 o'clk triplet and the D0.(Seberg/McIntyre)
- C** 3. Polarimeter Sect. 12 - Install new camera assemblies for Blue and Yellow(Bm. Comp.)
- C** 4. Local IR Polarimeter Sect. 12 - support installation/set-up(4days), (Beam Comp.)

RHIC TUNNEL(CONT'D)

- C 5. AC Dipole - Finish installation and continue testing(Bm. Comp.)
- C 6. Install Roman Pots in Sect. 1 Yellow and Sect. 2 Blue.(Vacu/FES)
- C 7. Turbo pump maintenance(Vacu)
- C 8. Polarimeters Sect. 12 - Install Am Source and inspect Si Detectors(Vacu)
- C 9. Vacuum - check and repair or replace faulty turbo gauging where required
- CAN 10. Controls in 1009C alcove - replace memory board in BPM1
- C 11. Alcoves room temperature monitors - check temp. sensors and filters on VME chassis(Ctrls. Grp.) - completed 1A,B,C, and 3A,B, and C.
- C 12. Controls - remote Modicon PLC in 1009A to 1008B
- C 13. Controls - replace f/O chassis fan in 1000P
- C 14. Controls - install permit link in 1002D and test
- C 15. Yellow Collimator - investigate Y plane motion(Beam Comp.)
- C 16. Crystal Collimator in Sect. 7 - relocate H.V. P.S. external to tunnel
- RS 17. Replace low resolution p.s. modules in 3C and 9C(Ctrls. Grp.)

DETAILED SCHEDULE

26 Nov.	0600	RHIC Beam off for scheduled maintenance <u>SHUTDOWN BOOSTER MAIN P.S. FOR SCHEDULED LIPPA FEEDER UPGRADE(0615-1745hrs)</u>
		Tandem/Linac beam off. Close beam stops. Begin AGS Restricted Access LOTO
	<u>0615</u>	<u>BOOSTER P.S. MAIN FEEDER SHUTDOWN</u> (John Dowd from PE will coordinate with MCR and LIPPA)
	0700	RHIC HP surveys of Sects. 10 and 12 for Restricted Access
	0700-0730	RHIC Operations Network Firewall upgrade
	0800	RHIC to Restricted Access Begin HP cursory and job specific surveys of AGS Ring.
	0930-1800	AGS Restricted Access entries
	1000-1200	Booster Controlled Access entries
	1030-1200	ATR/U Line Controlled Access entries
	1530	Booster equipment turn-on.(except Booster P.S.)
	1600	Linac ready for beam(pol. protons)

DETAILED SCHEDULED(CONT'D)

	1745	Booster Main P.S. switchover to operations feeder.
	1800	AGS Maintenance ends Booster Main P.S. turn-on AGS access ends. Sweep for Controlled Access
	1930	Remove AGS Restricted Access LOTO
	2100	Set-up for AGS Polarized Protons
Nov. 28(eve.)-29		RHIC sweeps of those areas where work has been completed
Nov. 29	1200	RHIC maintenance ends Complete sweeps for beam
	1400	RHIC ready for beam set-up